III. REMARKS

A. Brief Summary of the Pending Claims and the Office Action

When the Office action was issued, claims 1-14 were pending in the application. The Office action rejected claim 1 under 35 U.S.C. § 102(b), and claims 2-14 under 35 U.S.C. § 103(a). The Office action requested clarification of the claim for domestic priority. The Office action also objected to the drawings based upon a reference character "40" not being shown therein.

Claims 1-14 remain pending in the application.

B. Clarification Regarding the Application Filing Date and Claim for Domestic Priority

Applicants filed a provisional patent application at the U.S. Patent and Trademark Office ("PTO") on July 21, 2000. The application was subsequently accorded serial number 60/220,013 by the PTO.

The present application was filed on December 4, 2000, and was subsequently accorded serial number 09/729,533 by the PTO.

The original application papers filed on December 4, 2000, included an inventor's declaration which properly stated the claim to domestic priority under 35 U.S.C. § 119(e) to the prior provisional patent application. The serial number and filing date of the provisional application were correctly indicated on the declaration.

The first paragraph of the originally filed specification included a cross-reference concerning the provisional patent application. While the date of filing of the provisional patent application, July 21, 2000, was correctly stated in the cross-reference, the application serial number was indicated as 60/223,013 instead of the correct number of 60/220,013.

This unintentional mistake in the cross-reference portion of the specification has been corrected through the above amendment. A request for a corrected filing receipt will be submitted to the PTO in due course.

C. **Amendment to the Specification in Response to the Drawing Objection**

The paragraph of the specification relevant to the drawing objection has been amended in the above amendment to change the reference character "40" to "404." Reference character "404" is shown in the drawings. Applicants respectfully submit that the drawing objection has been overcome by this correction.

D. **Claim 1**

Claim 1 was rejected under 35 U.S.C. § 102(b) for allegedly lacking novelty in view of U.S. Patent No. 5,729,345 to Ludewig, et al. (the "Ludewig patent").

Claim 1 recites "determining a plurality of simulated induced distortions in the model to offset the produced distortions." Applicants respectfully submit that the Ludewig patent does not disclose, teach, or even suggest this process. The Ludewig patent discloses an automated method of measuring actual distortions of a weldment after a welding operation. The Ludewig patent does not disclose, or even address the possibility of or ability to determine induced distortions imposed on the weldment to offset the actual distortions.

The present invention teaches a method of determining a set of induced distortions which, when imposed on a weldment before welding, will result in the final form of the weldment being the nearly the same as the original form. The actual induced distortions are imposed on the weldment before welding. The welding process imposes further distortions on the weldment. The end result of the induced distortions and the actual distortions produced by the welding is that the weldment assumes nearly the same form it had before the induced distortions were imposed.

The Ludewig patent does not disclose "determining a plurality of simulated induced distortions in the model to offset the produced distortions." The Office action alleges that the Ludewig patent does disclose this process, citing various passages in support thereof. However, after a thorough review, the cited passages are each concerned with the process of empirically determining an actual distortion on a weldment, and not with determining induced strains which could offset the actual strains.

Therefore, for all of these reasons, Applicants respectfully suggest that the rejection of claim 1 was incorrect, and request that this rejection be withdrawn.

E. Claims 2-7

Claims 2-7 were rejected under 35 U.S.C. § 103(a) for allegedly being obvious in view of the Ludewig patent and U.S. Patent No. 5,901,426 to Okazaki, et al. (the "Okazaki patent"). Claims 2-7 each depend from claim 1 and include the same limitations thereof and additional limitations. As discussed above, the Ludewig patent does not disclose "determining a plurality of simulated induced distortions in the model to offset the produced distortions." The Office action does not allege that the Okazaki patent discloses or suggests this process, either. A review of the Okazaki patent confirms that it does not disclose or suggest this process. For this reason, Applicants respectfully conclude that a *prima facie* case of obviousness has not been established, and request that this rejection be withdrawn.

F. Claims 8-9

Claims 8-9 were rejected under 35 U.S.C. § 103(a) for allegedly being obvious in view of the Ludewig patent and the Okazaki patent. Claim 8 recites "determining a plurality of simulated pre-straining distortions in the model to offset the produced distortions." Neither the Ludewig patent nor the Okazaki patent discloses or even suggests this process of determining simulated pre-straining distortions. (See the above discussion regarding claim 1 for further

arguments and observations.) For this reason, Applicants respectfully conclude that a *prima facie* case of obviousness has not been established, and request that this rejection be withdrawn.

G. Claims 10-13

Claims 10-13 were rejected under 35 U.S.C. § 103(a) for allegedly being obvious in view of the Ludewig patent and the Okazaki patent. Claim 10 recites "determining a plurality of simulated pre-cambering distortions in the model to offset the produced distortions." Neither the Ludewig patent nor the Okazaki patent discloses or even suggests this process of determining simulated pre-cambering distortions. (See the above discussion regarding claim 1 for further arguments and observations.) For this reason, Applicants respectfully conclude that a *prima facie* case of obviousness has not been established, and request that this rejection be withdrawn.

H. Claim 14

Claim 14 was rejected under 35 U.S.C. § 103(a) for allegedly being obvious in view of the Ludewig patent and the Okazaki patent. Claim 14 recites "determining a plurality of simulated pre-cambering distortions in the model to offset the produced distortions." Neither the Ludewig patent nor the Okazaki patent discloses or even suggests this process of determining simulated pre-cambering distortions. (See the above discussion regarding claim 1 for further arguments and observations.) For this reason, Applicants respectfully conclude that a *prima facie* case of obviousness has not been established, and request that this rejection be withdrawn.

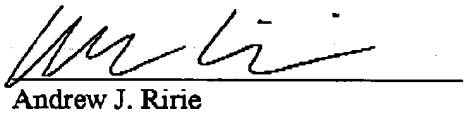
IV. Conclusion

The Office action set a shortened statutory three month period for reply expiring on November 27, 2004. A petition for a three month extension of time accompanies this reply.

The fees necessitated by the extension of time, and any other necessary fees, should be withdrawn from the undersigned's deposit account no. 03-1129.

If any issues remain to be resolved before this application can be allowed, the examiner is invited and encouraged to contact the undersigned for a telephone conference and an expeditious resolution.

Respectfully submitted,



Andrew J. Ririe
Patent Attorney, Caterpillar Inc.
Registration No. 45,597

Telephone: (309) 636-1974
Facsimile: (309) 675-1236